

Notice of Allowability

Application No.

10/058,600

Examiner

Jessica L. Rossi

Applicant(s)

KIM ET AL.

Art Unit

1733

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to Interview Summary, 7/29/04.
2. ☒ The allowed claim(s) is/are 11-16.
3. ☒ The drawings filed on 25 January 2002 are accepted by the Examiner.
4. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☒ All b) ☐ Some* c) ☐ None of the:
 1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

5. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
 6. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
7. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- | | |
|--|--|
| 1. <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 5. <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 2. <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 6. <input checked="" type="checkbox"/> Interview Summary (PTO-413),
Paper No./Mail Date <u>08022004</u> . |
| 3. <input checked="" type="checkbox"/> Information Disclosure Statements (PTO-1449 or PTO/SB/08),
Paper No./Mail Date <u>2/9/04</u> | 7. <input checked="" type="checkbox"/> Examiner's Amendment/Comment |
| 4. <input type="checkbox"/> Examiner's Comment Regarding Requirement for Deposit
of Biological Material | 8. <input checked="" type="checkbox"/> Examiner's Statement of Reasons for Allowance |
| | 9. <input type="checkbox"/> Other _____. |

EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Mr. Sheth on 7/29/04.

2. The application has been amended as follows:

Claims 1-10: cancelled.

Claim 11, line 1: "of the" was deleted and replaced by --for an--.

Claim 11, line 6: "the" was deleted before "upper" and replaced by --an--.

Claim 11, line 7: "at" was deleted after "mounted" and replaced by --on--.

Claim 11, line 9: --pressure by means of-- was inserted after "applying" and "pressure" was deleted after "fluid".

Claim 11, line 11: --of the disk-- was inserted after "portion".

Claim 11, line 12: "a" was deleted before "thin" and --the-- was inserted.

Claim 12, line 2: "including" was deleted and replaced by --further comprises--.

Claim 12, line 4: "a" was deleted before "thin" and --the-- was inserted.

Claim 12, line 5: "adjacent to a lower portion of" was deleted and replaced by --below--.

Claim 12, line 6: "a" was deleted before "thin" and --the-- was inserted.

Claim 12, line 8: "diameter" was deleted and replaced by --radial--.

Claim 13, line 2: "diameter" was deleted and replaced by --radial--.

Art Unit: 1733

Claim 13, line 2: "a" was deleted before "thin" and --the-- was inserted.

Claim 14, line 1: "a" was deleted before "fluid" and replaced by --the--.

3. The following is an examiner's statement of **reasons for allowance**:

With respect to claim 11, the prior art fails to teach or suggest a bonding apparatus for an optical disk comprising a pressure supplying means for applying pressure by means of a fluid to a first substrate and a thin film mounted on the first substrate with an adhesive agent therebetween according to a lapse of time from the central portion of the disk to its circumference to allow bonding between the substrate and film to proceed in a spiral.

US 6254716 to Russell et al. teaches a bonding apparatus for an optical disk comprising a processing chamber 22 into which upper and lower disks 28, 32 are loaded followed by partial evacuation of the chamber (Figure 1; column 4, lines 58-68). A nozzle applies liquid adhesive to the lower disk and then upper disk support 24 releases its vacuum thereby dropping the upper disk onto the lower disk (column 5, lines 10-15 and 40-60). Finally, the assembled disks are spun to provide a uniform layer of adhesive between the disks before curing the same (column 6, lines 30-36 and 53-65).

While the skilled artisan would have appreciated that the spinning step of Russell would be capable of allowing bonding of the upper and lower disks to proceed in a spiral, the reference fails to teach or suggest a pressure supplying means for applying pressure by means of a fluid to the upper and lower disks with the adhesive therebetween according to a lapse of time from the central portion of the disk to its circumference while bonding proceeds in this spiral.

JP 8106655 (provided in IDS) teaches a bonding apparatus for an optical disk comprising a pressure supplying means for applying pressure by means of a fluid (air forces elastic body 2

Art Unit: 1733

into contact with disks) to an upper disk 1a and a lower disk 1b with liquid adhesive therebetween according to a lapse of time from a central portion of the disk to its circumference (abstract).

However, the reference fails to teach or suggest this pressure supplying means allowing for bonding between the disks to proceed in a spiral. Furthermore, the skilled artisan would have appreciated that spinning of the disks would need to take place in order for bonding to proceed in a spiral wherein the skilled artisan would have appreciated that the pressure supplying means of JP '655 is not capable of applying pressure to the disks while they are spinning.

4. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Any inquiry concerning this communication or earlier communications from the examiner should be directed to **Jessica L. Rossi** whose telephone number is **571-272-1223**. The examiner can normally be reached on M-F (8:00-5:30) First Friday Off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Blaine R. Copenheaver can be reached on 571-272-1156. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Art Unit: 1733

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Jessica L. Rossi
Patent Examiner
Art Unit 1733



BLAINE COPENHEAVER
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 1700